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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/690,904	10/22/2003	Yukihito Furuhashi	17155	6368

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EXAMINER

PHAM, MICHAEL

ART UNIT	PAPER NUMBER
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2167

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	01/29/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary	Application No.	Applicant(s)	
	10/690,904	FURUHASHI ET AL.	
	Examiner	Art Unit	
	Michael D. Pham	2167	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 January 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1 and 4-12 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1 and 4-12 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☒ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

Detailed Action

Priority

1. Should applicant desire to obtain the benefit of foreign priority under 35 U.S.C. 119(a)-(d) prior to declaration of an interference, a certified English translation of the foreign application must be submitted in reply to this action. 37 CFR 41.154(b) and 41.202(e).

Failure to provide a certified translation may result in no benefit being accorded for the non-English application.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1 and 4-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6892193 by Bolle et. al. (hereafter Bolle) further in view of U.S. Patent 7051277 by Kephart et. al. (hereafter Kephart).

Claim 1:

Bolle is directed to "a system in which various feature values possessed by a multimedia object are used to search for a similar object, comprising:

a feature value calculation section configured to calculate one or more types of feature values from the multimedia object which is to be registered” [col. 17 lines 59-65, feature vector(feature value) computation (calculation) step. Col. 32 lines 60-64, every media item which is entered into the database (to be registered) is first used as target media item and searched against a data structure of feature vectors that represent the reference media items in the database.];

“a category setting section configured to set a recommended category, which is based on the feature value calculated by the feature value calculation section, on a database storing the multimedia object” [Abstract, classifiers based on features for multimedia items. Col. 32 l. 60-67, Every media item which is entered into the database is first used as target media item and searched against a data structure of feature vectors (feature value) that represent the reference media items in the database (based on feature value). This operation generates an index report of similar media items in the database. The media item to be entered into the database is stored along with similar media items, items of the same category (setting section configured to set a recommended category).].

“a registration section configured to associate the multimedia object which is to be registered” [col. 32 l. 60-64, every media item (multimedia object) which is entered into the database (to be registered) is first used as target media item and searched against a data structure of feature vectors that represent the reference media items in the database.],

“the feature value calculated by the feature value calculation section” [col. 17 lines 59-65, feature vector(feature value) computation (calculation) step.],

“said registration section registering the multimedia object”[classifiers used in the database, col. 32 lines 59-67], and

“feature value” “into the database” “[classifiers used in the database, col. 32 lines 59-67].

Bolle does not explicitly disclose “the recommended category is provided to a user as an initial value of a registration category for allowing the user to determine the registration category of the multimedia object to be registered”, “the registration category determined by the user”, and “the registration category determined by the user into the database”.

On the other hand, since Kephart, abstract, discloses “displaying, to the user, a representation of the one or more most likely categorical labels”, Kephart therefore suggests “the recommended category is provided to a user as an initial value of a registration category”.

Because Kephart, abstract, discloses “assisting a user with the task of categorizing a received electronic document into a collection” and “receiving data from the user, representative of a selected categorical label”, Kephart therefore suggests “allowing the user to determine the registration category of the multimedia object to be registered” and “the registration category determined by the user”, and “the registration category determined by the user into the database”.

Kephart further states that the electronic document can include audio or video files (i.e. multimedia objects).

Both systems are directed to categorizing multimedia objects into a database. It would have been obvious to have modified Bolle to have included “the recommended category is provided to a user as an initial value of a registration category for allowing the user to determine the registration category of the multimedia object to be registered”, “the registration category determined by the user”, and “the registration category determined by the user into the database” based on the disclosure of Kephart. One of ordinary skill would have been motivated to do so for the purpose of assisting the user with the task of categorizing electronic documents. Bolle discloses that there is a need to more precisely assign a topic to the classified media element col. 31 lines 32-37. However, Kephart improves upon this by allowing the user to selectively choose a category for the media object thereby categorizing it to tailor more specifically to the user rather than the system.

Claim 4:

Bolle and Kephart disclose the system according to claim 1. Bolle further discloses “wherein the category setting section selects a plurality of categories based on the feature value calculated by the feature value calculation section” [col. 26 lines 12-14, generating feature vectors $F(t)$ or $F(n)$ with the ultimate aim of dividing up a media stream into contiguous segments of one or more categories (selects plurality of categories based on feature vectors).]”.

Kephart discloses “displays the plurality of selected categories in order of high accuracy” [Kephart, col. 4 lines. 55-56, presenting the set of possible labels to the user in a way that accentuates the most likely labels. Col. 7 lines 59-63, representations are preferably ordered such that the first element is the name of the folder deemed by the classifier to be most likely destination.].

Claim 5:

The system according to claim 4, wherein the category setting section displays the plurality of categories selected based on the feature value (Bolle, abstract, categories selected based on feature value) as a list indicating the categories having the accuracy which is not less than a set threshold value (Kephart, col. 14 lines 14-16, bestfolders with any folders less than threshold removed), and a list indicating the categories having the accuracy which is less than the threshold value (Kephart, col. 14 lines 10-12, list of bestfolders containing less than the threshold value).

Claim 6:

Bolle and Kephart disclose the system according to claim 1, wherein the category setting section selects the category which is the registration end based on the feature value calculated by the feature value calculation section (Bolle, abstract, categories based on features), and displays the selected category to which a symbol representing the accuracy is attached (Kephart, figure 2, accuracy symbols attached to document).

Claim 7:

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Bolle and Kephart disclose the system according to claim 1. Bolle further discloses wherein the category setting section includes: a discriminant analysis section configured to discriminate/analyze the feature value of the registered multimedia object with respect to the registration-end category [Bolle, Col. 2 lines 40-49]; and

a storage section configured to store a discriminant analysis result of the discriminant analysis section [Bolle, Col. 32 lines 59-64, classifiers are stored. Since discriminant methods are essentially classifiers, they are stored.], wherein said category setting section uses the discriminant analysis result stored in the storage section to determine the category which is the registration end [Bolle, Col. 2 lines 40-49].

Claim 8:

Bolle and Kephart disclose the system according to claim 7. Bolle further discloses wherein the discriminant analysis section discriminates/analyzes the feature value with respect to the registered objects including the multimedia object constituting the registration object, after the category setting section determines the registration end of the multimedia object [Bolle, col. 34 lines 39-44, comparison of target stream and reference segments].

Claim 9:

Bolle and Kephart disclose the system according to claim 1, further comprising: an object designation section configured to designate an arbitrary multimedia object as the multimedia

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object which is the registration object [Bolle, col. 14 lines 34-38classifies a media item in a collection]; and an attribute designation section configured to carry out at least one of designation [Bolle, abstract, categorization based on features] and input of attribute information of the multimedia object designated by the object designation section[Kephart, abstract, receiving data from user representative of a selected categorical label.].

Claim 10:

Bolle and Kephart disclose the system according to claim 1, wherein the category setting section includes an attribute designation section configured to carry out at least one of designation and input of attribute information of the multimedia object which is the registration object [Bolle, Col. 33 lines 5-8].

Claim 11:

Bolle is directed to “a method in which various feature values possessed by a multimedia object are used to search for a similar object, comprising:

calculating one or more types of feature values from the multimedia object which is to be registered “ [col. 17 lines 59-65, feature vector(feature value) computation (calculation) step. Col. 32 lines 60-64, every media item which is entered into the database (to be registered) is first used as target media item and searched against a data structure of feature vectors that represent the reference media items in the database.];

“setting a recommended category, which is based on the calculated feature value, on a database storing the multimedia object;” [Abstract, classifiers based on features for multimedia

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items. Col. 32 l. 60-67, Every media item which is entered into the database is first used as target media item and searched against a data structure of feature vectors (feature value) that represent the reference media items in the database (based on feature value). This operation generates an index report of similar media items in the database. The media item to be entered into the database is stored along with similar media items, items of the same category (setting a recommended category).]

Bolle further discloses “associating with the multimedia object which is to be registered,” [col. 32 l. 60-64, every media item (multimedia object) which is entered into the database (to be registered) is first used as target media item and searched against a data structure of feature vectors that represent the reference media items in the database.] “the calculated feature value” [col. 17 lines 59-65, feature vector(feature value) computation (calculation) step.] “to register the multimedia object” and “the feature value” “into the database” “[Bolle classifiers used in the database, col. 32 lines 59-67].

Bolle does not explicitly disclose “presenting the recommended category as an initial value of a registration category to a user for allowing the user to determine the registration category of the multimedia object to be registered;” and “the registered category”

On the other hand, Kephart, Abstract, is directed to “assisting a user with the task of categorizing a received electronic document into a collection”. Kephart, abstract, discloses that the system includes the steps of “classifying the document to obtain one or more most likely categorical

labels”; and “displaying, to the user, a representation of the one or more most likely categorical labels”. Kephart, abstract, further discloses “receiving data, from the user, representative of a selected categorical label” and “labeling the document within the collection with the selected categorical label”.

Since Kephart, abstract, discloses “displaying, to the user, a representation of the one or more most likely categorical labels”, Kephart therefore suggests “presenting the recommended category as an initial value of a registration category to a user”.

Because Kephart discloses “assisting a user with the task of categorizing a received electronic document into a collection” and “receiving data from the user, representative of a selected categorical label”, Kephart therefore suggests “for allowing the user to determine the registration category of the multimedia object to be registered” and “the registration category determined by the user”, and “the registration category determined by the user into the database”.

Kephart further states that the electronic document can include audio or video files (i.e. multimedia objects).

Both systems are directed to categorizing multimedia objects into a database. It would have been obvious to have modified Bolle to have included “presenting the recommended category as an initial value of a registration category to a user for allowing the user to determine the registration category of the multimedia object to be registered;” and “the registered category”

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based on the disclosure of Kephart. One of ordinary skill would have been motivated to do so for the purpose of assisting the user with the task of categorizing electronic documents. Bolle discloses that there is a need to more precisely assign a topic to the classified media element col. 31 lines 32-37. However, Kephart improves upon this by allowing the user to selectively choose a category for the media object thereby categorizing it to tailor more specifically to the user rather than the system.

Claim 12:

Claim 12 contains similar limitations as that of claim 1 and is therefore rejected under similar reasons as that of claim 1.

Response to Arguments

4. Applicant's arguments, see page 3 lines 14-16, filed 1/3/07, with respect to the independent claims have been fully considered and are persuasive. Prior Final action has been withdrawn.

However, this office action made final is based on the filed amendment on 7/13/2006 (see MPEP §706.07(a)).

Conclusion

5. The prior art made of record listed on PTO-892 and not relied, if any, upon is considered pertinent to applicant's disclosure.

6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Contact Information

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michael D. Pham whose telephone number is (571)272-3924. The examiner can normally be reached on Monday - Friday 9am - 5:00pm.

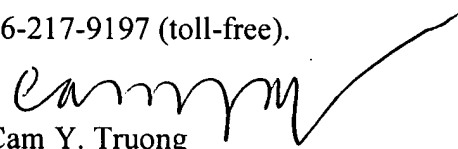
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Cottingham can be reached on 571-272-7079. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Michael Pham
Art Unit 2167
Examiner

M.P.


Cam Y. Truong
Art Unit 2162
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